

PATENT COOPERATION TREATY

PCT

INTERNATIONAL PRELIMINARY REPORT ON PATENTABILITY

(Chapter II of the Patent Cooperation Treaty)

(PCT Article 36 and Rule 70)

REC'D 20 APR 2006

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Applicant's or agent's file reference CCCC10116PCT2	FOR FURTHER ACTION	See Form PCT/IPEA/416																
International application No. PCT/US04/28908	International filing date (day/month/year) 07 September 2004 (07.09.2004)	Priority date (day/month/year) 05 September 2003 (05.09.2003)																
International Patent Classification (IPC) or national classification and IPC IPC: H04H 1/04(2006.01);H04J 1/00(2006.01) USPC: 370/487																		
Applicant COMCAST CABLE HOLDING, LLC																		
<p>1. This report is the international preliminary examination report, established by this International Preliminary Examining Authority under Article 35 and transmitted to the applicant according to Article 36.</p> <p>2. This REPORT consists of a total of <u>4</u> sheets, including this cover sheet.</p> <p>3. This report is also accompanied by ANNEXES, comprising:</p> <p style="margin-left: 20px;">a. <input type="checkbox"/> (sent to the applicant and to the International Bureau) a total of ___ sheets, as follows:</p> <p style="margin-left: 40px;"><input type="checkbox"/> sheets of the description, claims and/or drawings which have been amended and are the basis of this report and/or sheets containing rectifications authorized by this Authority (see Rule 70.16 and Section 607 of the Administrative Instructions).</p> <p style="margin-left: 40px;"><input type="checkbox"/> sheets which supersede earlier sheets, but which this Authority considers contain an amendment that goes beyond the disclosure in the international application as filed, as indicated in item 4 of Box No. I and the Supplemental Box.</p> <p style="margin-left: 20px;">b. <input type="checkbox"/> (sent to the International Bureau only) a total of (indicate type and number of electronic carrier(s)) _____, containing a sequence listing and/or tables related thereto, in electronic form only, as indicated in the Supplemental Box Relating to Sequence Listing (see Section 802 of the Administrative Instructions).</p> <p>4. This report contains indications relating to the following items:</p> <table style="width: 100%; margin-left: 20px;"> <tr> <td><input checked="" type="checkbox"/> Box No. I</td> <td>Basis of the report</td> </tr> <tr> <td><input type="checkbox"/> Box No. II</td> <td>Priority</td> </tr> <tr> <td><input type="checkbox"/> Box No. III</td> <td>Non-establishment of opinion with regard to novelty, inventive step and industrial applicability</td> </tr> <tr> <td><input type="checkbox"/> Box No. IV</td> <td>Lack of unity of invention</td> </tr> <tr> <td><input checked="" type="checkbox"/> Box No. V</td> <td>Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement</td> </tr> <tr> <td><input type="checkbox"/> Box No. VI</td> <td>Certain documents cited</td> </tr> <tr> <td><input checked="" type="checkbox"/> Box No. VII</td> <td>Certain defects in the international application</td> </tr> <tr> <td><input type="checkbox"/> Box No. VIII</td> <td>Certain observations on the international application</td> </tr> </table>			<input checked="" type="checkbox"/> Box No. I	Basis of the report	<input type="checkbox"/> Box No. II	Priority	<input type="checkbox"/> Box No. III	Non-establishment of opinion with regard to novelty, inventive step and industrial applicability	<input type="checkbox"/> Box No. IV	Lack of unity of invention	<input checked="" type="checkbox"/> Box No. V	Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement	<input type="checkbox"/> Box No. VI	Certain documents cited	<input checked="" type="checkbox"/> Box No. VII	Certain defects in the international application	<input type="checkbox"/> Box No. VIII	Certain observations on the international application
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Date of submission of the demand 28 November 2005 (28.11.2005)	Date of completion of this report 15 March 2006 (15.03.2006)																	
Name and mailing address of the IPEA/ US Mail Stop PCT, Attn: IPEA/US Commissioner for Patents P.O. Box 1450 Alexandria, Virginia 22313-1450 Facsimile No. (571) 273-3201	Authorized officer <i>James will for</i> Brian Nguyen Telephone No. (571) 272-3084																	

Form PCT/IPEA/409 (cover sheet)(April 2005)

INTERNATIONAL PRELIMINARY REPORT ON PATENTABILITY

International application No.

PCT/US04/28908

Box No. I Basis of the report

1. With regard to the language, this report is based on:

- ☐ the international application in the language in which it was filed.
- ☐ a translation of the international application into _____, which is the language of a translation furnished for the purposes of:
- ☐ international search (under Rules 12.3 and 23.1(b))
- ☐ publication of the international application (under Rule 12.4(a))
- ☐ international preliminary examination (under Rules 55.2(a) and/or 55.3(a))

2. With regard to the elements of the international application, this report is based on *(replacement sheets which have been furnished to the receiving Office in response to an invitation under Article 14 are referred to in this report as "originally filed" and are not annexed to this report)*:

- ☒ the international application as originally filed/furnished
- ☒ the description:
pages 1-8 _____ as originally filed/furnished
pages* NONE _____ received by this Authority on _____
pages* NONE _____ received by this Authority on _____
- ☒ the claims:
pages 9-13 _____ as originally filed/furnished
pages* NONE _____ as amended (together with any statement) under Article 19
pages* NONE _____ received by this Authority on _____
pages* NONE _____ received by this Authority on _____
- ☒ the drawings:
pages 1-2 _____ as originally filed/furnished
pages* NONE _____ received by this Authority on _____
pages* NONE _____ received by this Authority on _____
- ☐ a sequence listing and/or any related table(s) - see Supplemental Box Relating to Sequence Listing.

3. ☐ The amendments have resulted in the cancellation of:

- ☐ the description, pages _____
- ☐ the claims, Nos. _____
- ☐ the drawings, sheets/figs _____
- ☐ the sequence listing (*specify*): _____
- ☐ any table(s) related to the sequence listing (*specify*): _____

4. ☐ This report has been established as if (some of) the amendments annexed to this report and listed below had not been made, since they have been considered to go beyond the disclosure as filed, as indicated in the Supplemental Box (Rule 70.2(c)).

- ☐ the description, pages _____
- ☐ the claims, Nos. _____
- ☐ the drawings, sheets/figs _____
- ☐ the sequence listing (*specify*): _____
- ☐ any table(s) related to the sequence listing (*specify*): _____

* If item 4 applies, some or all of those sheets may be marked "superseded."

INTERNATIONAL PRELIMINARY REPORT ON PATENTABILITY

International application No.
PCT/US04/28908**Box No. V Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement****1. Statement**

Novelty (N)	Claims <u>1-28</u>	YES
	Claims <u>NONE</u>	NO
Inventive Step (IS)	Claims <u>1-28</u>	YES
	Claims <u>NONE</u>	NO
Industrial Applicability (IA)	Claims <u>1-28</u>	YES
	Claims <u>NONE</u>	NO

2. Citations and Explanations (Rule 70.7)

Claims 1-14 and 26-28 meet the criteria set out in PCT Article 33(2)-(3), because the prior art does not teach or fairly suggest a customer premises equipment (CPE) comprising an embedded settop box configured to output a CPE identifier; and an embedded cable modem in communication with the settop box, the modem receiving the CPE identifier and configured to scan downstream channels of a cable modem terminal system (CMTS) for a matching downstream channel descriptor (DCD) message, the matching DCD message having a DCD message identifier that matches the CPE identifier, the modem tuning to the one or more tunnels identified in the matching DCD message and delivering the OOB messages included in the tuned to tunnels to the settop box..

Claims 15-25 meet the criteria set out in PCT Article 33(2)-(3), because the prior art does not teach or fairly suggest scanning downstream channels of a cable modem termination system (CMTS) with an embedded cable modem for downstream channel descriptor (DCD) messages; determining if one of the scanned channels includes a matching DCD message, the matching DCD message having a DCD message identifier that matches a CPE identifier; and controlling the modem to tune to the tunnels specified in the matching DCD message and to deliver the messages included in the tuned-to tunnels to an embedded settop box.

Claims 1-28 meet the criteria set out in PCT Article 33(4), and thus meet industrial applicability because the subject matter claimed can be made or used in industry.

INTERNATIONAL PRELIMINARY REPORT ON PATENTABILITY

International application No.

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Box No. VII Certain defects in the international application

The following defects in the form or contents of the international application have been noted:

Claims 2, 15, and 26 are objected to under PCT Rule 66.2(a)(iii) as containing the following defect(s) in the form or contents thereof: In claim 2, line 2, it is suggested replace "CD" with --DCD--. In claim 15, line 8, it is suggested to replace "the CMTS" with --a cable modem termination system (CMTS)-- and in line 12, replace messaging" with --message--. In claim 26, line 10, it is suggested to replace "the DCD message identifier" with --a DCD message identifier--.